

### REMARKS

According to the examiner, the applicant has not refuted the examiner's "*prima facie* case" of obviousness. As the examiner puts it:

**The applicant's argument is a general allegation that the claims define a patentable invention without specifically pointing out how the language of the claims patentably distinguishes them from the references and the *prima facie* case of obviousness presented above by the examiner.**

With respect to how the language of the claims "patentably distinguishes ... from the references," the applicant respectfully relies on the examiner's explicit concession that:

**none of Gatto, Jones, Makivic, Official Notice, AAPA, Morningstar.com, E\*Trade or Excel explicitly disclose the exact method for use in a visualization system comprising [these] steps ...**

There appears to be no disagreement that the cited references do not describe these features of the claims.

With respect to whether the applicant has failed to contest the examiner's *prima facie* case of obviousness with enough specificity, the applicant respectfully disagrees that the examiner's argument amounts to a *prima facie* case of obviousness. In any case, the applicant has explained why the claims are patentable using as much detail as possible in light of the relatively broad (non detailed) positions taken by the examiner.

Take claim 14 as an example. It recites two key features:

"generating data representing at least one stripe indicating a range of odds of a performance measure having indicated values at a succession of times, the range of odds being based on a probability density function of the performance measure, computed from a second derivative of an option price function, for each of the succession of times,"

and

"a contour of a boundary of each stripe varying, for each of the succession of times, according to variations in the odds of the performance measure being within the range of values indicated by the stripe, as determined by the probability density function."

These are important, clear, specific, novel, and non-obvious features of claim 14.

Yet the examiner finds them obvious based only on a general assertion that gives no specifics about where the prior art describes the features or how they would specifically have been obvious from what the prior art does show. The examiner also reaches an improper inference from the generalizations:

... Gatto, Jones, Makivic, Official Notice, AAPA, Morningstar.com, E\*Trade collectively disclose a wide variety of computer automated graphic displays of a variety of data output from mathematical algorithms related to financial security market calculations regarding historical and projected data. Excel discloses one example of many general capabilities of off the shelf office software for graphically displaying data outputs of mathematical algorithms in many formats and geometric shapes with many notation capabilities.”

“Further, the use of graphic displays of data was old, well known and a ubiquitous phenomenon at the time of applicant's invention. The computer revolution automated the art of graphic displays and put it on the computer screen and on computer printouts, first in a single color contrast on a background color (e.g. white on a dark grayish or black background), and then in a multiplicity of colors on a background of the user's choice. Some of the dramatic examples of this computer automation revolution are CADICAM, maps, computer animation, and the computer displays of tables, charts and graphs in all kinds of shapes, virtually any known geometric shape and other hand drawn shapes as well. The most well known softwares which came into the market place in the 1980's for the graphic and geometric display of data were Lotus123, Lotus Notes, Harvard Graphics, Excel and Adobe, among many others, along with other off the shelf and custom software systems. Several of these software systems have automated the process of creating basic free form mathematically related graphics and general art on a computer screen available in relatively inexpensive off the shelf packages to be run on the ordinary desk top or laptop PC.

Applicant is referred to select pages of an independent EXCEL® 5 training book as an example of what one of the simpler off the shelf software packages was capable of prior to Applicant's invention directly related to Applicant's invention. *The ordinary practitioner* of the art would have been familiar with these capabilities at the time of Applicant's invention and also would have known that off the shelf and custom softwares were capable of all of the graphic display features in Applicant's invention. The ordinary practitioner also would have known that widespread use was being made in the financial arts of these very handy computer automated graphic displays of quantitative information of every kind being used by office, accounting, financial and investment clerks, financial managers, financial traders, investors of every level of sophistication and PhD academics in the financial arts alike.  
[emphasis added]

If the applicant understands correctly, the examiner is asserting only the broad general proposition that people of skill in the financial field knew that software could be (and was being) used for many kinds of graphical displays of data generated by algorithms. Apparently, from this, the examiner concludes that the specific features of claim 14 would have been obvious.

With all due respect, the examiner has made an improper inference in the underlined italicized clause, and that inference cannot support an argument of obviousness.

Contrary to the examiner's statement, an ordinary practitioner could not "have known that off the shelf and custom softwares were capable of all of the graphic display features in applicant's invention" because that practitioner would have had no way of knowing of the specific graphic display features of, say, claim 14, in the first place. The examiner assumes that the practitioner would have known of the existence of those features, but, as the examiner has noted, there is nothing in any of the references to support that assumption.

By analogy, just because a semiconductor fabricator knows that CMOS features or building blocks can be used to fabricate a wide variety of circuits does not mean that specific new circuits that are invented and then built from CMOS elements would have been obvious to the fabricator. To the contrary, the hundreds of patents on new CMOS circuits issued every year by the patent office prove that new circuits that use known CMOS techniques are patentable. Similarly, the availability of a wide variety of graphical display techniques for the financial industry would not have made obvious inventions of new graphical display features, such as the ones claimed by the applicant.

Thus, the following conclusion by the examiner that the specific features of the applicant's claims would have been obviousness is not supported by the facts:

**"However, an ordinary practitioner of the art at the time of Applicant's invention would have found it as obvious to have combined the disclosures of Gatto with the art of Jones, Makivic, Official Notice, AAPA (such as that of Morningstar.com and E\*Trade) and Excel in order to produce a method for use in a visualization system comprising the steps of the above stated limitations of claims 14-18, 22, 23 & 28. The practitioner's motivation would have been based on the desire to provide users with improved tools for effectively viewing historical estimates, analytical projections and recommendations regarding financial assets such as securities (Gatt, [0008])."**

No matter how strong the practitioner's motivation, there was nothing in the named references from which he could have reached the applicant's invention. There was no road map, no indication in any way that these features existed or would have been useful. A person who has, in the examiner's words, a "desire to provide users with improved tools for effectively viewing historical estimates, analytical projects and recommendations regarding financial assets such as securities," still has to come up with ways to satisfy those users. There are potentially infinitely many devices and ways to do that. The applicant has conceived features that are

powerful, effective, and new. There is no indication that a practitioner, no matter how motivated, would have discovered those features from the named references.

Because the examiner has given no detail of how the practitioner would have come up with those ways, the applicant respectfully is unable to provide any more detailed a refutation than the one articulated above.

Canceled claims, if any, have been canceled without prejudice or disclaimer.

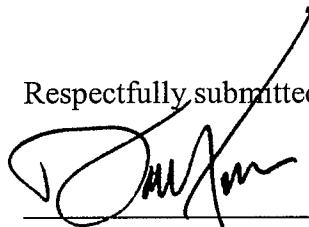
Any circumstance in which the applicant has (a) addressed certain comments of the examiner does not mean that the applicant concedes other comments of the examiner, (b) made arguments for the patentability of some claims does not mean that there are not other good reasons for patentability of those claims and other claims, or (c) amended or canceled a claim does not mean that the applicant concedes any of the examiner's positions with respect to that claim or other claims.

No fees are believed to be due at this time. Please apply any other charges or credits to deposit account 06-1050, referencing attorney docket 11910-003001.

Date: \_\_\_\_\_

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Respectfully submitted,



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